## AMENDMENTS TO THE CLAIMS

1-15. (canceled)

16. (currently amended) A compound of the formula (I),

where

M is a metal of transition group IV, V or VI of the Periodic Table of the Elements

Ti. Zr or Hf.

- R<sup>1</sup> are identical or different and are each a radical Si(R<sup>12</sup>)<sub>3</sub>, where R<sup>12</sup> are identical or different and are each a hydrogen atom or a C<sub>1</sub>-C<sub>40</sub>-group, or R<sup>1</sup> is a C<sub>1</sub>-C<sub>30</sub>-group, or two or more radicals R<sup>1</sup> may be connected to one another in such a way that the radicals R<sup>1</sup> and the atoms of the cyclopentadienyl ring which connect them form a C<sub>4</sub>-C<sub>24</sub>-ring system which may in turn be substituted,
- R<sup>2</sup> are identical or different and are each a radical Si(R<sup>12</sup>)<sub>3</sub>, where R<sup>12</sup> are identical or different and are each a hydrogen atom or a C<sub>1</sub>-C<sub>40</sub>-group, or R<sup>2</sup> is a C<sub>1</sub>-C<sub>30</sub>-group, or two or more radicals R<sup>2</sup> may be connected to one another in such a way that the radicals R<sup>2</sup> and the atoms of the cyclopentadienyl ring which connected them form a C<sub>4</sub>-C<sub>24</sub>-ring system which may in turn be substituted,

- R<sup>3</sup> are identical or different and are each a C<sub>6</sub> C<sub>24</sub> aryl, C<sub>5</sub> C<sub>24</sub>-heteroaryl, is C<sub>7</sub>-C<sub>30</sub>-alkylaryl, fluorinated C<sub>6</sub>-C<sub>24</sub>-aryl, or fluorinated C<sub>7</sub>-C<sub>30</sub>-alkylaryl,
- X is a halogen atom,
- n is from 0 to 4.
- n' is from 0 to 4,
- k is 1,
- is a bridging structural element between the two cyclopentadienyl rings defined as

  M<sup>3</sup>R<sup>13</sup>R<sup>14</sup>, wherein M<sup>3</sup> is carbon or silicon and R<sup>13</sup> and R<sup>14</sup> are identical or

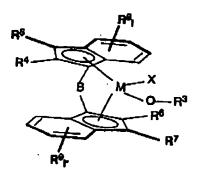
  different and are C<sub>1</sub>-C<sub>10</sub>-alkyl, C<sub>5</sub>-C<sub>14</sub>-aryl or trimethyl silyl,

  and

one or both cyclopentadienyl rings are substituted in such a way that they form an indenyl ring.

17-21. (canceled)

22/. (currently amended) The compound of claim 21 claim 16 having the formula



where

R<sup>4</sup> - R<sup>7</sup> are identical or different and are each a hydrogen atom or a C<sub>1</sub>-C<sub>20</sub>-group,

- R<sup>8</sup>, R<sup>9</sup> are identical or different and are each a hydrogen atom, a halogen atom or a C<sub>1</sub>-C<sub>20</sub>-group, and two radicals R<sup>8</sup> or R<sup>9</sup> may form a monocylic or polycyclic ring system which may in turn be substituted,
- $R^3$ ,  $M_a$  and X and B are as previously defined, and
- I, I' are identical or different and are each an integer from zero to 4.
- 23-26. (canceled)
- 27. 4 (currently amended) The compound of claim 24 claim 22 wherein the indenyl rings are identical.
- 28. (previously presented) The compound of claim 27 wherein M is Zr, the indenyl rings are 2-methyl-4,5-benzoindenyl or 2-methyl-indenyl and X is chlorine.
- 29. (previously presented) The compound of claim 28 wherein the indenyl rings are 2-methyl-4,5-benzoindenyl.
- 30. (previously presented) The compound of claim 28 wherein the indenyl rings are 2-methyl-indenyl.
- 31. 7 (currently amended) The compound of claim 29 wherein R<sup>3</sup> is 2,4-tert butyl-phenyl 2.4-di-tert-butyl-phenyl, 2,4-di-tert-pentyl-phenyl or 2-isopropyl-5-methyl-phenyl.
- 32. (currently amended) The compound of claim 36 wherein and R<sup>3</sup> is 2,4-di-tert-butyl-phenyl or 2-isopropyl-5-methyl-phenyl.
- 23. 12 (currently amended) The compound of claim 27 wherein B is SiR<sup>13</sup>R<sup>14</sup> wherein R<sup>13</sup> and R<sup>14</sup> are identical or different and are each hydrogen or C<sub>1</sub> C<sub>20</sub> hydrocarbon containing group Me or Ph.
- 34. 8 (previously presented) The compound of claim 31 wherein B is dimethylsilanediyl.

(previously presented) The compound of claim 32 wherein B is dimethylsilanediyl. (previously presented) The compound of claim 22 wherein X is chlorine. 37. 1 (currently amended) A catalyst comprising at least one compound as claimed in claim 16 and a support and , optionally, a cocatalyst. currently amended) A process for preparing a polyolefin which comprises polymerizing an olefinic monomer in the presence of a catalyst as claimed in claim 33 claim 37/ (new) The compound of claim 16, wherein the moiety MX(OR3) is zirconium monochloride mono(2,4-di-tert-butylphenoxide), zirconium monochloride mono(2,6-di-tert-butylphenoxide), zirconium monochloride mono(3,5-di-tert-butylphenoxide), zirconium monochloride mono(2,6-di-sec-butylphenoxide), zirconium monochloride mono(2,4-di-methylphenoxide), zirconium monochloride mono(2,3-di-methylphenoxide), zirconium monochloride mono(2,5-di-methylphenoxide), zirconium monochloride mono(2,6-di-methylphenoxide), zirconium monochloride mono(3,4-di-methylphenoxide), zirconium monochloride mono(3,5-di-methylphenoxide), zirconium monochloride mono(2-methylphenoxide), zirconium monochloride mono(3-methylphenoxide), zirconium monochloride mono(4-methylphenoxide), zirconium monochloride mono(2-ethylphenoxide), zirconium monochloride mono(3-ethylphenoxide), zirconium monochloride mono(4-ethylphenoxide),

09-01-05 19:35

: 2026590105

Fax sent bu

zirconium monochloride mono(2-sec-butylphenoxide), zirconium monochloride mono(2-tert-butylphenoxide), zirconium monochloride mono(3-tert-butylphenoxide), zirconium monochloride mono(4-sec-butylphenoxide), zirconium monochloride mono(4-tert-butylphenoxide), zirconium monochloride mono(2-isopropyl-5-methylphenoxide), zirconium monochloride mono(4-isopropyl-3-methylphenoxide), zirconium monochloride mono(5-isopropyl-2-methylphenoxide), zirconium monochloride mono(5-isopropyl-3-methylphenoxide), zirconium monochloride mono(2,4-bis (2-methyl-2-butyl)phenoxide), zirconium monochloride mono(2,6-di-tert-butyl-4-methylphenoxide). zirconium monochloride mono(4-nonylphenoxide), zirconium monochloride mono(isopropylphenoxide), zirconium monochloride mono(propylphenoxide), zirconium monochloride mono(trimethylphenoxide), zirconium monochloride mono(tert-butyl-methylphenoxide), zirconium monochloride mono(2-tert-butyl-4-ethylphenoxide), zirconium monochloride mono(2,6-diisopropylphenoxide), zirconium monochloride mono(4-octylphenoxide) or zirconium monochloride mono(2,6-di-tert-butyl-4-ethylphenoxide). (new) The compound of claim 32, wherein the moiety MX(OR3) is zirconium monochloride mono(2,4-di-tert-butylphenoxide), zirconium monochloride mono(2,6-di-tert-butylphenoxide),

zirconium monochloride mono(3,5-di-tert-butylphenoxide), zirconium monochloride mono(2,6-di-sec-butylphenoxide), zirconium monochloride mono(2,4-di-methylphenoxide), zirconium monochloride mono(2,3-di-methylphenoxide), zirconium monochloride mono(2,5-di-methylphenoxide), zirconium monochloride mono(2,6-di-methylphenoxide), zirconium monochloride mono(3,4-di-methylphenoxide), zirconium monochloride mono(3,5-di-methylphenoxide), zirconium monochloride mono(2-methylphenoxide), zirconium monochloride mono(3-methylphenoxide), zirconium monochloride mono(4-methylphenoxide), zirconium monochloride mono(2-ethylphenoxide), zirconium monochloride mono(3-ethylphenoxide), zirconium monochloride mono(4-ethylphenoxide), zirconium monochloride mono(2-sec-butylphenoxide), zirconium monochloride mono(2-tert-butylphenoxide), zirconium monochloride mono(3-tert-butylphenoxide), zirconium monochloride mono(4-sec-butylphenoxide), zirconium monochloride mono(4-tert-butylphenoxide), zirconium monochloride mono(2-isopropyl-5-methylphenoxide), zirconium monochloride mono(4-isopropyl-3-methylphenoxide), zirconium monochloride mono(5-isopropyl-2-methylphenoxide), zirconium monochloride mono(5-isopropyl-3-methylphenoxide),

NDDQ LLP

zirconium monochloride mono(2,4-bis (2-methyl-2-butyl)phenoxide),
zirconium monochloride mono(4-nonylphenoxide),
zirconium monochloride mono(4-nonylphenoxide),
zirconium monochloride mono(isopropylphenoxide),
zirconium monochloride mono(propylphenoxide),
zirconium monochloride mono(trimethylphenoxide),
zirconium monochloride mono(tert-butyl-methylphenoxide),
zirconium monochloride mono(2-tert-butyl-4-ethylphenoxide),
zirconium monochloride mono(2,6-diisopropylphenoxide),
zirconium monochloride mono(4-octylphenoxide) or
zirconium monochloride mono(4-octylphenoxide) or

(new) The compound of claim 16 wherein the solubility of said compound of formula (I) measured as molar concentration in toluene at room temperature is at least doubled compared with the solubility of the corresponding metallocene dichloride wherein X is Cl and OR<sup>3</sup> is Cl.

(new) The compound of claim 22 wherein the solubility of said compound of formula (I) measured as molar concentration in toluene at room temperature is at least doubled compared with the solubility of the corresponding metallocene dichloride wherein X is Cl and OR<sup>3</sup> is Cl.